



Touchstone® WTM552A and G

Wireless Telephony Modem



Features

- DOCSIS® 2.0 and PacketCable™ 1.1/1.5 compliant design
- High performance WiFi-Alliance certified 802.11b/g wireless access point
- High Speed Internet via 4 ports 10/100 Base-T Ethernet (RJ-45)
- Up to two lines of carrier-grade VoIP
- Firmware compatibility with legacy and future Touchstone products
- Multiple Protocol Support: PacketCable (NCS) and Session Initiation Protocol (SIP)

Building upon the success of over 20+ million voice lines deployed, ARRIS is pleased to introduce the Touchstone WTM552 family of wireless gateway products. The WTM552 combines two analog voice lines, a 4-port router, and wireless access point into a single device capable of supporting both home and small business applications. Using multi processor technology, the WTM552 can achieve full bandwidth performance without affecting ARRIS's legendary standard of voice quality.

Gateway Feature Set

- Stateful Packet Inspection (SPI) Firewall with denial of service prevention, port forwarding, URL blocking, and DMZ support
- Network Address Translation (NAT)
- VPN pass-through support (IPSec, L2TP, and PPTP)
- User Friendly Web Interface with settings to allow remote Web page access
- WAN settings to operate as a DHCP client or to support static IP assignment
- WPA™ and WPA2™ Personal, 64/128 bit WEP, and MAC authentication Wireless Security Options
- Includes support for WMM® QOS, WMM Power Save, and Wireless Mesh Telephony
- Independent reset for wireless module – does not effect telephony

Leadership in Battery Technology

- Multiple Battery Options Available – 2-cell and 4-cell Li-Ion solutions for up to 4 and 8 hours of standby battery hold time
- Firmware configurable battery management and reporting allows customization of operation parameters
- Battery Life – Li-Ion solutions give 6 to 10 years life expectancy almost double older technologies

ARRIS Touchstone DOCSIS 3.0 Telephony Modem WTM552 A & G

Specifications

Physical

Operating Temperature °F (°C) Storage	41 to 104 (5 to 40)
Operating Relative Humidity (Min-Max)	5-85%(Non condensing)
Temperature °F (°C)	-40 to 158 (-40 to 70)
Color	Dark Gray
Dimensions (HxWxD) in. (cm)	8.6 x 2.1 x 7.1 (21.9 x 5.3 x 18.0) - excluding F-connector
Weight lbs (kg)	1.2 (0.54) without battery
Battery: 4 Hour Back-up Option (-4)	
Backup Capacity	Lithium-ion 2.2 Ah
Battery Dimensions	in. 1.2 x 1.85 x 3.1 (cm) (3.0 x 4.7 x 7.9)
Weight	lbs 1.5 (kg) (0.66)
Battery: 8 Hour Back-up Option (-8)	
Backup Capacity	Lithium-ion 4.4 Ah
Battery Dimensions	in. 1.2 x 1.85 x 5.7 (cm) (3.0 x 4.7 x 14.5)
Weight	lbs 1.7 (kg) (0.77)
Battery Storage Temperature	°F (°C) -4 to 140 (-20 to 60)
<i>Note: Storage above 77 °F (25 °C) will significantly reduce life of the battery and not recommended.</i>	
Telemetry	AC, Fail, Battery Low, Battery Missing, Replace Battery
Diagnostic LEDs	Power, DS, US, Online, Link, Ethernet 1, Ethernet 2, Ethernet 3, Ethernet 4, WLAN, DMZ, Telephone 1, Telephone 2, Battery (G and H Models)

Interfaces

RF Interface	External 'F' type connector
Data Interfaces	10/100 Base-T Ethernet (4, RJ-45 connector)
Telephony Interface	2 lines; RJ-14 ("Line 1/2"), RJ-11 ("Line 2")
RF Antenna Interface	External SMTA connector to single detachable dipole antenna
Input Voltage (nominal)	100/240 VAC 50/60 Hz

Telephony

Supervisory Voltage	48 V dc nominal
Maximum Loop Length to CPE	1500 ft (457M) of 26 AWG (0.4 mm) wire
Ringing Load Capacity	10 REN total; 5 per line
Provisionable High Loop Current Mode	Yes
Telcordia™ GR 1089 (Lightning and Power Surge) Tested	Yes
Programmable Interface for Worldwide Applications	Yes

(Supports multiple country templates)

RF Downstream

Frequency Range (MHz)	88-860
Modulation (QAM)	64 or 256
Data Rate (Mbps)	Up to 42
RF Input Sensitivity Level (dBmV)	-15 to +15
Carrier Bandwidth	6 MHz

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ARRIS Touchstone DOCSIS 3.0 Telephony Modem WTM552A & G

RF Upstream

Frequency Range	5-42 MHz
Modulation	QPSK, 8 QAM, 16 QAM, 32 QAM, 64 QAM & 128 QAM (S-CDMA only)
Data Rate (Mbps) (Max.)	up to 30.72
RF Output Level (dBmV)	
A-TDMA	+8 to 54 dBmV (32 QAM, 64 QAM) +8 to 55dBmV (8 QAM, 16 QAM) +8 to 58 dBmV (QPSK)
S-CDMA	+8 to +53 dBmV (all modulations)
Automatic Level Adjust	Yes
Gain Control Range (dB)	50
Frequency Stability (kHz)	±5
Output Impedance (Ohms)	75

Standards

Codec: G.711, 64 kbps, μ and A-law encoded speech	PacketCable 1.0 and PacketCable 1.5
Enhanced codec support planned (G.726, G.728, G.729E, iLBC, BV16)	RFC3261 SIP: Session Initiation Protocol
T.38 Fax Relay	UL® 60950-1, FCC Part 68 (1998) Subpart F for Telephony Ports RJ14 and RJ11, CE
DOCSIS 2.0	IEEE Std. 802.11b, 1999 Edition IEEE Std. 802.11g, 2002 Edition

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Ordering Information

Part #	Description
718087	Touchstone WTM552A/NA DOCSIS 2.0 / PacketCable 1.0/1.5 Compliant E-MTA – no battery backup capability Integrated 100-240 VAC, 50/60 HZ Power supply with 12 foot power cord with NEMA 1-15 pass-through power plug Includes Quick Install Guide, Ethernet Cable, USB Cable, and CD-ROM with users guide and USB drivers
719409	Touchstone WTM552A/CE DOCSIS 2.0 / PacketCable 1.0/1.5 Compliant E- MTA – no battery backup capability Integrated 100-240 VAC, 50/60 HZ Power supply w/ 12 foot power cord with CEE 7/16 Euro power plug Includes Quick Install Guide, Ethernet Cable, USB Cable, and CD-ROM with users guide and USB drivers
718088	Touchstone WTM552B/CE Euro-DOCSIS 2.0 / Euro-PacketCable 1.0/1.5 Compliant E- MTA – no battery backup capability Integrated 220/240 VAC, 50 HZ Power supply with 12 foot power cord with CEE 7/16 Euro power plug Includes Quick Install Guide, Ethernet Cable, USB Cable, and CD-ROM with users guide and USB Drivers
719410	Touchstone WTM552G/CE-0 DOCSIS 2.0 / PacketCable 1.0/1.5 Compliant E-MTA Integrated 100-240 VAC, 50/60 HZ Power supply with 12 foot power cord with CEE 7/16 Euro power plug Includes Quick Install Guide, Ethernet Cable, USB Cable, and CD-ROM with users guide and USB drivers NO battery included
719411	Touchstone WTM552G/CE-4 DOCSIS 2.0 / PacketCable 1.0/1.5 Compliant E-MTA Includes 1, 2-cell, Li-Ion Battery Pack for up to 4 hours of battery back-up Integrated 100-240 VAC, 50/60 HZ Power supply with 12 foot power cord with CEE 7/16 Euro power plug Includes Quick Install Guide, Ethernet Cable, USB Cable, and CD-ROM with users guide and USB drivers
719412	Touchstone WTM552G/CE-8 DOCSIS 2.0 / PacketCable 1.0/1.5 Compliant E-MTA Includes 1, 4-cell, Li-Ion Battery Pack for up to 8 hours of battery back-up Integrated 100-240 VAC, 50/60 HZ Power supply with 12 foot power cord with CEE 7/16 Euro power plug Includes Quick Install Guide, Ethernet Cable, USB Cable, and CD-ROM with users guide and USB drivers
718089	Touchstone WTM552G/NA-0 DOCSIS 2.0 / PacketCable 1.0/1.5 Compliant E-MTA Integrated 100-240 VAC, 50/60 HZ Power supply with 12 foot power cord with NEMA 1-15 pass-through power plug Includes Quick Install Guide, Ethernet Cable, USB Cable, and CD-ROM with users guide and USB drivers NO battery included
718090	Touchstone WTM552G/NA-4 DOCSIS 2.0 / PacketCable 1.0/1.5 Compliant E-MTA Includes 1, 2-cell, Li-Ion Battery Pack for up to 4 hours of battery back-up Integrated 100-240 VAC, 50/60 HZ Power supply with 12 foot power cord with NEMA 1-15 pass-through power plug Includes Quick Install Guide, Ethernet Cable, USB Cable, and CD-ROM with users guide and USB drivers
718091	Touchstone WTM552G/NA-8 DOCSIS 2.0 / PacketCable 1.0/1.5 Compliant E-MTA Includes 1, 4-cell, Li-Ion Battery Pack for up to 8 hours of battery back-up Integrated 100-240 VAC, 50/60 HZ Power supply with 12 foot power cord with NEMA 1-15 pass-through power plug Includes Quick Install Guide, Ethernet Cable, USB Cable, and CD-ROM with users guide and USB drivers
719413	Touchstone WTM552H/CE-0 Euro-DOCSIS 2.0 / Euro-PacketCable 1.0/1.5 Compliant E-MTA Integrated 100-240 VAC, 50/60 HZ Power supply with 12 foot power cord with CEE 7/16 Euro power plug Includes Quick Install Guide, Ethernet Cable, USB Cable, and CD-ROM with users guide and USB drivers NO battery Included
719414	Touchstone WTM552H/CE-4 Euro-DOCSIS 2.0 / Euro-PacketCable 1.0/1.5 Compliant E-MTA Includes 1, 2-cell, Li-Ion Battery Pack for up to 4 hours of battery back-up Integrated 100-240 VAC, 50/60 HZ Power supply with 12 foot power cord with CEE 7/16 Euro power plug Includes Quick Install Guide, Ethernet Cable, USB Cable, and CD-ROM with users guide and USB drivers
719415	Touchstone WTM552H/CE-8 Euro-DOCSIS 2.0 / Euro-PacketCable 1.0/1.5 Compliant E-MTA Includes 1, 4-cell, Li-Ion Battery Pack for up to 8 hours of battery back-up Integrated 100-240 VAC, 50/60 HZ Power supply with 12 foot power cord CEE 7/16 Euro power plug Includes Quick Install Guide, Ethernet Cable, USB Cable, and CD-ROM with users guide and USB drivers

Accessories

718003	2-Cell, 2.2 Ah, Li-Ion Battery Pack for WTM552G
718004	Kit of 60, 2-Cell, 2.2 Ah, Li-Ion Battery Packs for WTM552G
718005	One, 4-Cell, 4.4 Ah, Li-Ion Battery Pack for WTM552G
718006	Kit of 30, 4-Cell, 4.4 Ah, Li-Ion Battery Packs for WTM552G
TBD	Side Spare Foot Kit (100 per) for WTM552
718007	Battery Door Kit (50 per) for WTM552
717988	North American NEMA 1-15 plug Power Cord for WTM552G, 12 foot with pass-through
TBD	European CEE 7/16 Power Cord for WTM552G, 12 foot

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